Farm & Rural Communities

Assessing the Economic Well-Being of Farm Households

While commodity prices or farm income are often cited as indicators of the economic well-being of farm households, the picture they give is certainly incomplete and most likely distorted. Because half of farm operators spend the majority of their work time off the farm, their household income is driven more by the *general* economy than by the farm economy. Nor is it enough to recognize the diverse sources of income. A comprehensive assessment of well-being must move beyond income and consider other dimensions such as household consumption and wealth.

USDA's 2000 Agricultural Resource Management Survey (ARMS), in addition to collecting information on household income and consumption, queried farm operators about household farm and nonfarm assets. These data provide a unique opportunity to examine farm household well-being in the context of the entire economy.

Farm household income levels used to be below those of nonfarm households. Average farm operator household income first exceeded the average income of all U.S. households in the early 1990s and has been consistently higher since 1996. Statistics for 2000 show average farm household income at $62,019, compared with $57,045 for all U.S. households. A comparison of median incomes (which reduces the influence of extreme values) also shows earnings of farm households exceeding those of all U.S. households.

What accounts for farm household income surpassing average U.S. household income? Earnings from all off-farm sources grew from $10 billion in 1964 to $125 billion in 2000. Meanwhile, sector-wide net cash farm income has increased by only $36 billion. Thus, it is the increase in off-farm earnings of farm families that has pushed up farm household income.

Wages and salaries make up a significant proportion of off-farm earnings even though they declined from 65 percent in 1964 to below 56 percent of total off-farm earnings in 2000. Nonetheless, the absolute level of farm household wage earnings was nearly 9 times larger in 2000 than in 1964.

There are several reasons for this growth in off-farm earnings. First, off-farm labor force participation rates for rural farm residents rose from approximately 52 percent in 1960 to 65 percent in 1990. Additionally, an increasing share of farm households have at least one member working off the farm full-time (participation of rural farm females more than doubled during the same period), and more farm operators worked off the farm. The economic boom of the 1990s also helped by creating more jobs and higher wages in areas within commuting distance of farm households.

In the past, economists have characterized economic well-being in terms of income's ability to support current consumption expenditures. However, two individuals with the same income but different amounts of wealth will have different consumption potential. Wealth, defined as the sum of farm and nonfarm net worth, represents potential spending power. A majority of farm wealth (net worth) is in farm assets, especially land, although it is difficult to liquidate on short notice. Average farm household net worth has increased steadily over the years, mainly from the appreciation in farmland values.

Classifying Households By Income & Wealth

Farm household economic well-being is affected both by the level of income and wealth available to the household and by how income and wealth influence household consumption. The well-being of households has both an absolute component, which compares income and wealth to a selected standard, and a relative component, which measures the ability of households to meet consumption needs.

Movements in commodity prices, production shortfalls due to weather, and lack of off-farm jobs all affect well-being. Changes in economic conditions such as interest rates can have competing effects on farm and off-farm incomes. All of these factors contribute to income variations in a given year. Access to financial or other "liquid" assets (including savings and inventories) can help forestall a tightening in household consumption. Likewise, income that exceeds consumption can be added to savings or used to pay down debt.

Analysis of ARMS data by USDA's Economic Research Service (ERS) suggests that farm households have higher incomes, greater wealth, and lower con-

Most Farm Households Have Wealth that Exceeds the U.S. Household Median

	Income/wealth relative to median U.S. household				
	Lower income, lower wealth[1]	Lower income, higher wealth[1]	Higher income, lower wealth[1]	Higher income, higher wealth[1]	All-farm total
Percent of all households*	25	25	25	25	100
Percent of farms in group	6	42.6	2.6	48.7	100
Averages:					
Farm size (operated acres)	175	435	197[2]	455	423
			Dollars		
Government payment	3,523	6,115	3,143[2]	9,014	7,294
Farm income	-5,325[2]	-10,551	1,351[3]	15,530	2,791
Off-farm income	23,321	24,800	82,269	92,493	59,228
Farm operator household income	17,995	14,249	83,619	108,023	62,019
Total household expenditures	17,118	19,994	29,018	32,073	25,948
Household net worth	39,503	449,521	21,034[2]	656,040	514,212
Household farm net worth	43,145	387,396	38,897	517,587	420,950

*For reference: by definition, 25 percent of all U.S. households would fall into each of the four categories of relationship to median U.S. household income and wealth.
1. "Lower" or "higher" income or wealth than the median U.S. household. Median income for all U.S. households in 2000 was $42,000; median wealth was $78,000. Wealth is defined as the sum of a household's farm and nonfarm net worth. 2. Standard error of the estimate is greater than 25 percent and less than or equal to 50 percent. 3. Standard error of the estimate is greater than 75 percent.
Source: 2000 USDA Agricultural Resource Management Survey.

Economic Research Service, USDA

sumption expenditures than do all U.S. households. Farm household incomes are better able to support their consumption needs. Since average comparisons can be misleading, the study divided farms into four groups using levels of income and wealth relative to all U.S. households:

- farm households with higher income and higher wealth than the median U.S. household (49 percent of farm households);
- farm households with higher income but lower wealth (less than 3 percent of farm households);
- farm households with lower income but higher wealth (about 43 percent of farm households); and
- farm households with both lower income and lower wealth (6 percent of farm households).

Higher income, higher wealth. In 2000, almost half of U.S. farm households had both higher incomes and greater wealth than all U.S. households. The vast majority of these farms (98 percent) reported household income greater than consumption expenditures in 2000—on average, an excess of $76,000 in income over consumption expenditures. This group of farms reported average net worth of $656,000, of which $138,500 was household assets not owned by the farming operation.

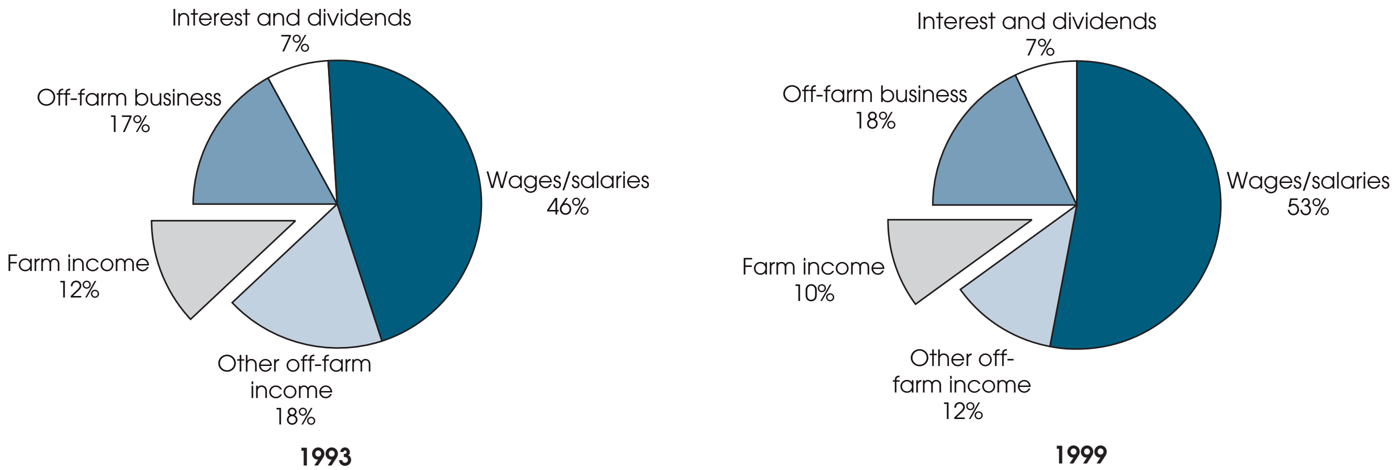
This group of higher income, higher wealth households includes a disproportionate share of larger farm operations and farm operators who reported a primary occupation other than farming. On average, this group of households operated the largest farms as measured by acreage (455 acres), accounted for 62 percent of farm output, drew 60 percent of government payments, and had, by far, the highest educational attainment.

Higher income, lower wealth. The 2.6 percent of farm households with higher incomes and lower wealth than all U.S. households are almost entirely focused on off-farm activities, with 84 percent reporting a primary occupation other than farming. Younger than average, with more having attended or completed college, their household incomes are almost entirely from off-farm sources and exceed consumption expenditures by a wide margin.

Lower income, higher wealth. Of the nearly 43 percent of farm households reporting lower income but greater wealth than all U.S. households, 42 percent reported annual household incomes below their expenditures in 2000. This group contains a disproportionate share of mid-size farms and of farmers who report that they are retired. For many of these, farm-derived income is often negative. But on average, money owed from sales and additions to inventory would have been sufficient to offset half of the group's income shortfall. Taking these assets into account, the proportion of lower income, higher wealth households with incomes less than consumption drops from 42 percent to 38 percent. Thus, stockholding within their farm businesses as well as funds owed the business from prior economic actions must be considered. Without accounting for these sources of liquid or near-liquid assets, the proportion of households considered disadvantaged could be substantially higher. This would have been particularly true for households of younger operators.

The lower income, higher wealth farms hold a vast majority of their net worth ($450,000 on average) in business assets (such as land, machinery, and crop and livestock inventories). The retired or more elderly farmers in the group who do not have sufficient current earnings from farming can access their accumulated assets or begin to consume capital assets (e.g., choose not to replace machinery or equipment as it wears out). Generating a sustained flow of income from the house-

A Majority of Farm Household Income Comes From Off-Farm Sources



Source: Agricultural Resource Management Survey (ARMS), 1993 and 1999.

Economic Research Service, USDA

hold's asset base to support household consumption requires either disposing of the farm or renting/leasing to other farmers or to the government through land retirement programs (such as conservation reserve). Many lower income, higher wealth households report receiving government payments, averaging $6,115 in 2000. This group also contains farm businesses whose income is temporarily lower because of either low commodity prices or production shortfalls. For many of these operations, adequate consumption levels can be maintained by drawing on savings or other assets.

Lower income, lower wealth. About 6 percent of farm households have both lower incomes and lower wealth than all U.S households. Principally small and limited-resource farms, this group has thin margins between household incomes and consumption expenditures. Of these households, 21 percent report farming as their primary occupation, and nearly 38 percent are limited-resource households. Moreover, their small asset base can be insufficient to meet any unexpected shortfall in household earnings. Nearly one out of three of these households reported income less than consumption expenditures in 2000. For these households, there is insufficient income to support even relatively low levels of consumption and few assets to meet or enhance consumption.

Policy Implications

Today, farm households are virtually indistinguishable from nonfarm households in their levels of income and diversity of employment. As a result, government policies that influence general economic conditions may have a much more profound impact on farm families than do farm policies.

While farm families may suffer low incomes in any given year, low incomes are not necessarily chronic or involuntary. Relatively low household income in a particular year may result from an unusual weather event. The seeming immobility of farmers may, in fact, be voluntary and may simply reflect the nonmonetary value farm households assign to farm ownership and rural living in comparison with wages and benefits from nonfarm employment.

Issues regarding Federal government support of farm income gain breadth when considered in light of farm income's role in farm household well-being. A limited number of households depend on farming for a majority of their farm household income. Since household incomes for farms that get the majority of their income from farming are generally well above the average for all households, the case for income support as a necessity for well-being is weakened.

During low-income years, many farms are able to maintain consumption by drawing on savings or by borrowing. Government policies that reduce credit constraints or increase farm household wealth may better address a farm household's yearly needs than do policies tied to farm production, farmland, or commodity production. By reducing market risk, government farm programs may create a disincentive for farmers to accumulate cash reserves for unexpected income shortfalls.

One way to minimize the adverse and unintended effect of farm payments is to pursue policies aimed at increasing off-farm job opportunities. One such policy tool provided tax incentives to attract private-sector investment in areas targeted for economic development (i.e., areas with pervasive poverty and unemployment).

The role of human capital is a related issue. Nearly one-quarter of U.S. farm operators, particularly older farmers, attained less than a high school education. Farmers with less formal education tend to miss out on higher paying off-farm jobs and job advances. This suggests a benefit to revisiting programs that authorized USDA to administer national grants to promote public secondary education curricula and enrollments in agriculture-related studies. Such programs might instead provide training for off-farm work.

Capitalization of government payments into higher prices for farmland, production and marketing rights, production facilities, and other specialized resources has helped to create wealth (*AO* November 2001).

Estimates of the value of farmland attributable to government payments range between 8 and 25 percent. Some fear that removing the direct link between program payments and land values would cause severe adjustment problems. Yet farm families have diversified their asset holdings beyond the farm business, in effect helping to insulate them from the potential impacts of farm asset deflation.

Recognition of the importance of farm households' wealth and income diversity as it relates to off-farm sources of income should not diminish the overall benefits and opportunities that agriculture provides to local economies. A flow of farm and off-farm resources has the potential to create an environment that will attract and sustain private investment, job growth, and income generation activities in rural America. **AO**

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